

FWP FORESTRY PROGRAM

REPORT TO THE 65TH MONTANA LEGISLATURE

MONTANA FISH, WILDLIFE & PARKS



Figure 1 - Threemile Wildlife Management Area. Photo Credit: J. Parke

JANUARY 2017

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Figure 2 - FWP Forestry Work Locations 2015 - 2016

OVERVIEW

This report summarizes Montana Fish, Wildlife & Parks' (FWP) forestry work and projects completed between January 1, 2015 and December 31, 2016 as well as the status of Forest Management Account balances for fiscal years (FY) 2015 and 2016. The forestry program came into existence in 2009 with House Bill No. 42 requiring FWP to implement programs to address fire mitigation, pine beetle infestation, and wildlife habitat enhancement with a priority on forested lands larger than 50 acres (87-1-201,9,a,iv, MCA) and the establishment of the Forest Management Account to implement forest management using revenue generated from timber sales (87-1-621, MCA).

In 2011, the Legislature added a provision with House Bill No. 619 requiring FWP to calculate an annual sustainable yield on its forested lands and adopt forest management plans based on that yield. The annual timber sale requirement for the timber sale program administered by FWP may not exceed the annual sustained yield (87-1-622, 3, MCA). FWP contracted with Mason, Bruce & Girard, Inc., a forestry consulting company, to conduct an independent sustained yield calculation which was completed on December 31, 2013. Their report found that 151,477 acres have potential commercial forest value with 57,403 acres (37.7%) available for harvest. Of the acres available for harvest, 344 are on Fishing Access Sites (FAS), 6,237 are on State Parks (SP), and 50,822 are on Wildlife Management Areas. The report calculated that over the next 50 years, an annual sustained yield of 4.1 million board feet (MMBF) could be harvested on FWP lands.

The 2015 Legislature authorized one-time-only funding for the hiring of a forester by FWP to help develop the forestry program and forest management plans and to keep forest projects on schedule. The position was filled by Jason Parke in August 2015, but its funding is one-time-only. Converting this FTE into a permanent base position is a priority during the 65th legislative session.

SUMMARY OF ACCOMPLISHMENTS, 2009-2016

Since the establishment of the FWP forestry program in 2009, several forest management projects have been completed (see table 1 below). These projects have treated 3,487 acres and generated 68,641 tons of forest products (approximately 2,500 log truck loads).

Table 1 - Forestry Projects Summary, 2009-2016

Project	Region	Acres	Harvest Volume (Tons)	Completion Year	Description
Thompson Chain of Lakes SP	1	748	8,056	2010	Fuels reduction, hazard tree mitigation and habitat improvement.
Flathead Lake SP – Wayfarers	1	15	0	2010	Dwarf mistletoe mitigation.
Flathead Lake SP – Wild Horse Island	1	215	0	2011	Pine beetle suppression and ponderosa pine, grassland habitat restoration.

Project	Region	Acres	Harvest Volume (Tons)	Completion Year	Description
Blackfoot-Clearwater WMA (Ovando Mountain)	2	365	10,028	2012	Treatments included improved forage, restoring historic forest conditions, aspen enhancement, lodgepole pine salvage, and fuels reduction.
River Junction FAS	2	5	175	2012	Mountain pine beetle salvage of ponderosa pine.
Marshall Creek WMA Blowdown Salvage	2	8	406	2013	Blowdown salvage, cleared public roadway.
Stuart Mill Bay FAS	2	80	6,432	2014	Lodgepole pine salvage and thinning, slash disposal, tree planting, and fence removal.
Mount Haggin WMA 1	3	400	12,163	2014	Lodgepole pine salvage, aspen enhancement.
Mount Haggin/Fleecer WMA Habitat Projects	3	289	0	2015	Elk and mule deer winter range enhancement, conifer removal to promote grass, sagebrush, bitterbrush, and aspen.
Mount Haggin WMA 2	3	732	19,529	2016	Elk and mule deer winter range enhancement, salvage, fuels reduction.
West Kootenai WMA	1	251	6,988	2016	Whitetail deer winter range enhancement, fuels reduction.
Threemile WMA	2	342	4,864	2016	Elk and deer winter range enhancement, aspen restoration, fuels reduction, pine beetle risk reduction.
Lone Pine SP	1	20	0	2016	Reduce bark beetle risk, improve tree vigor, remove mistletoe infected trees.
Milltown SP	2	17	0	2016	Reduce bark beetle risk, improve public safety, aesthetics, and wildlife habitat.

FOREST MANAGEMENT ACCOUNT

The following tables summarize forest management account activities within each FWP division for FY 2015-2016.

STATE PARKS

Table 2 - State Parks Forest Management Account Balance, FY 2015-2016

STARTING BALANCE (JULY 1, 2014)		\$7,526.32
PROJECT NAME	EXPENSE	INCOME
Interest		\$10.73
ENDING BALANCE (JUNE 30, 2016)		\$7,537.05

FISHING ACCESS SITES

Table 3 - Fishing Access Site Forest Management Account Balance, FY 2015-2016

STARTING BALANCE (JULY 1, 2014)		\$92,335.52
PROJECT NAME	EXPENSE	INCOME
Stuart Mill Bay FAS Thinning (Miller Creek Reforestation)	\$12,881.00	
Stuart Mill Bay FAS Seedlings (DNRC Nursery)	\$12,075.10	
Overhead (indirect costs)	\$4,435.00	
Interest		\$342.80
ENDING BALANCE (JUNE 30, 2016)		\$63,287.22

WILDLIFE MANAGEMENT AREAS

Table 4 - Wildlife Management Areas Forest Management Account Balance, FY 2015-2016

STARTING BALANCE (JULY 1, 2014)		\$ 606,382.46
PROJECT NAME	EXPENSE ¹	INCOME
Mt. Haggin II		\$ 301,404.02
West Kootenai WMA	\$ 7,326.00	\$ 29,037.37
Mt. Haggin/Fleecer WMA Habitat Projects	\$ 34,480.00	
Threemile WMA	\$ 44,078.67	\$ 28,715.62
Blackfoot-Clearwater WMA	\$ 1,401.33	
Overhead (indirect costs)	\$ 13,103.18	
Base (salary, operating costs)	\$ 90,859.80	
Interest		\$ 4,638.71
ENDING BALANCE (JUNE 30, 2016)		\$ 778,929.20

¹ Some projects were partially funded with grants or with Habitat Montana. These funding sources are not shown here.

PROJECTS

FISHING ACCESS SITES

For calendar year 2015 through 2016, no new forest management projects have been undertaken and no projects were planned on Fishing Access Sites (FAS).

STATE PARKS

Two forestry projects have been implemented on State Parks during the last biennium. Both projects were non-commercial thinning projects focused on improving forest health and promoting resilience to bark beetles.

Lone Pine State Park



Figure 3 - Masticator chipping Douglas-fir trees at Lone Pine State Park. Photo Credit: Dave Landstrom, FWP

The Lone Pine State Park forestry project was completed in March 2016. The primary objective of the project was to increase tree vigor and resilience against bark beetle attack. A masticator was used to chip 4-10 inch dbh (diameter at breast height) Douglas-fir, focusing on mistletoe infested trees. The debris from the chipping operation was left on site for soil nutrient recycling. MCH pheromone packets, a repellent that deters Douglas-fir bark beetle, were placed on Douglas-fir trees in the 5-acre area surrounding the visitor center, picnic shelter, and scenic overlooks.

This project treated 20 acres and did not produce merchantable forest products or generate revenue for the Forest Management Account. A grant from Montana Department of Natural Resources and Conservation (DNRC) helped fund the project.

Milltown State Park

The Milltown State Park Forest Health Project was implemented in the fall of 2015 and the spring of 2016. The primary project goal was to improve overall forest vigor and reduce susceptibility to bark beetle infestations. Additional goals included improving public safety, visual aesthetics, and wildlife habitat. This non-commercial, hand thinning, project treated approximately 16.8 acres. Trees infested with bark beetles were removed as were the majority of trees (ponderosa and Douglas-fir) less than 6 inches dbh. Approximately 80 percent of the slash was removed and/or burned. To benefit wildlife, approximately 16 small habitat piles were left on site. Approximately 200 western larch were planted in burn piles as a follow up effort to restore forest diversity.



Figure 4 - Treated stand at Milltown State Park. Photo Credit: Michael Kustudia, FWP

Work involved a contracted crew (Watershed Consulting, LLC.), the Montana Conservation Corps, DNRC service forester assistance, volunteer help, and an FWP crew. FWP received a grant from the Montana DNRC to pay for the project.

WILDLIFE MANAGEMENT AREAS

Since the last legislative session, several forest management projects have been completed, are under contract, or are in a planning stage. Projects include both commercial timber harvest and non-commercial treatments such as hand-thinning and prescribed fire.

Mt. Haggin II

The Mt Haggin II forestry project was implemented starting in March 2013 through November 2015. The timber harvest operations were mostly completed in December of 2014 with final cleanup and slash disposal occurring in the summer/fall of 2015. Project objectives were primarily to remove hazard trees killed by mountain pine beetle (MPB) along roads and trails, reduce MPB susceptibility, and create shaded fuel breaks in strategic locations within the Mt. Haggin WMA.

Approximately 732 acres were treated and the project resulted in the sale 19,529 tons, or roughly 2.5 million board feet (MMBF) of sawlogs, house logs, post and pole, firewood, and pulp. Sale of forest products generated revenue for the Forest Management Account. FWP contracted with a forestry consulting firm, Northwest Management Inc., to oversee the project.

Mt. Haggin/Fleecer WMA Habitat Projects

The Mt. Haggin/Fleecer WMA habitat projects were implemented in July through August 2015. The project involved 289 acres of hand thinning conifer trees to promote important winter range forage species such as antelope bitterbrush, aspen, sagebrush, and bunchgrasses. Treatment was non-commercial and did not include the sale of forest products. The areas treated in this project are critical winter range for elk and mule deer.



Figure 5 - Conifer removal to promote bitterbrush, post treatment. Photo Credit: Vanna Boccadori, FWP

FWP contracted with a forestry consulting firm, Northwest Management Inc., to oversee the project. FWP utilized their Forest

Management Account as well as grants from the Rocky Mountain Elk Foundation and the Mule Deer Foundation.

West Kootenai WMA

The West Kootenai WMA forest management project was implemented starting in April 2014 through November 2015. The project objectives included creating strategic fuel breaks along



Figure 6 - Post treatment stand on the West Kootenai WMA.

Photo Credit: Tim Thier, FWP

existing roads and property lines, thinning dense Douglas-fir stands to promote development of mature and ecologically diverse forest structure, and reducing the risk of insects and disease outbreaks. The West Kootenai WMA is critical winter range for whitetail deer and elk.

Approximately 251 acres were treated and the project resulted in the sale of 6,988 tons, or roughly 931 thousand board feet (MBF) of sawlogs and pulp. Sale of forest products generated

revenue for the Forest Management Account. FWP contracted with forestry consulting firm, Northwest Management Inc., to oversee the project. A grant from Montana DNRC and funds from the Forest Management Account were used pay for implementation of the project.

Threemile WMA

The Threemile WMA Forest Habitat Restoration Project was implemented starting in December 2015 through November 2016. Several years of planning went into this project with a timber harvest plan being completed in 2012. The project objectives were to remove conifers expanding into bunchgrass meadows, enhance aspen stands, reduce mountain pine beetle susceptibility, and reduce the risk of stand replacement fire. The Threemile WMA is critical winter range for deer and elk. The project was designed to be a pilot project to gain internal and external feedback to inform future forest management decisions on the WMA. The project gained significant, positive media attention with three news articles and one opinion article in the Ravalli Republic as well as a 5-o'clock news story on NBC Montana (<http://www.nbcmontana.com/news/keci/group-tours-threemile-tree-thinning-project/32265698>).

The project treated 342 acres and resulted in the sale of 4,864 tons, or roughly 648 MBF of sawlogs and pulp. Sale of forest products generated revenue for the Forest Management Account. The treatments of aspen stands, removing conifers from bunchgrass meadows, and precommercial thinning (PCT) were paid for with a grant from DNRC and the Forest Management Account. FWP entered into a cooperative agreement with DNRC to oversee the project.



Figure 7 - Threemile treatment unit, post harvest. Photo Credit: Scott Kuehn, Salmon River Wood, Inc.

This project was the first project to be implemented by FWP's forester, Jason Parke. At the time FWP's forester started, DNRC had the project boundaries flagged out and the cut-tree marking had been completed. The project required approximately ½ mile of road construction/reconstruction and DNRC was going to shelve the project until 2016 due to the concern that the road would not be constructed in time for the winter logging season. FWP's forester expedited the road construction project and the road work was completed in November 2015; ready to be used for logging and hauling that winter. FWP's forester also secured a grant from DNRC which allowed the aspen, meadow enhancement, and PCT treatments to be completed that same winter.



Figure 8 - Stand to be treated on the Blackfoot-Clearwater WMA. Photo Credit: Neil Simpson, DNRC.

Blackfoot-Clearwater WMA

The Blackfoot-Clearwater WMA Forest Restoration Project contract was awarded to Bull Creek Forestry, Inc. (a logging company based in Seeley Lake, MT) in November 2016. There will be two phases of the project with the timber harvesting to be completed by December 2018 and understory thinning to be completed following the timber harvest phase. The project objectives are aspen enhancement, promoting development of mature forest structure, enhancing winter forage plants, reducing susceptibility to

insects and disease, and fuels reduction. The project area is critical winter range for elk and whitetail deer as well as being important for elk calving and grizzly bear spring habitat.

The project will treat 354 acres and is estimated to produce 1,624 tons of sawlogs (approximately 231 MBF) and roughly 1,500 to 2,000 tons of pulp. Timber sale revenue will be deposited into the Forest Management Account. FWP developed the project in cooperation with DNRC service foresters through a Cooperative Agreement. FWP contracted a forestry consulting firm, Northwest Management Inc., to complete the cut-tree marking. FWP's forester, with assistance from the area biologist, will oversee the timber harvesting operation. FWP plans to hire contracted services to complete the understory thinning following the timber harvest.

Additional work is being planned on the west side of the Blackfoot-Clearwater WMA. Approximately 900 acres have been identified as a high priority for treatment to remove expanding conifers from rough fescue grasslands that are critically important for elk winter range. Removing conifer in-growth to enhance aspen stands and restore ponderosa pine savannah conditions has also been identified as a priority treatment. FWP submitted proposals for the Forests in Focus 2016 and Forests in Focus 3 grant programs offered by DNRC, but the proposals were not awarded. FWP, in concert with several adjacent landowners in the Blackfoot-Clearwater region, submitted a grant proposal for 250 acres and will be notified in December 2016 regarding funding. FWP is also pursuing grant opportunities through the Rocky Mountain Elk Foundation. The 900 acre project area includes commercial and non-commercial treatments that could produce an estimated 1.2 MMBF and approximately 15,000 tons of pulp logs. Grant funding is needed due to the low value of forest products and high cost of treatments. That is logging, hauling, and slash disposal costs are greater than the value of the small ponderosa pine sawlogs and pulp logs.



Figure 9 - Aspen stand to be treated on the Gallatin WMA.
Photo Credit: Jason Parke, FWP

Gallatin WMA

In June 2016, the FWP forester and area wildlife biologist met with U.S. Forest Service (USFS) personnel from the Custer Gallatin National Forest on an on-going aspen enhancement project near Big Sky, MT. The Gallatin WMA borders the on-going aspen project and FWP was invited to include approximately 50 acres of the WMA into the on-going project. FWP agreed to include the area and entered into a cooperative agreement with the Custer Gallatin National Forest. The U.S. Forest

Service, under the authority of the Wyden Amendment, will implement the project between September 2016 and December 2017. The USFS is using funds, in part provided by FWP's Upland Game Bird Habitat Enhancement Program and from the Rocky Mountain Elk Foundation. The project includes hand thinning to remove conifers from aspen stands and prescribed burning to promote aspen regeneration. Treatments are non-commercial and won't result in the sale of forest products. The Gallatin WMA is critical elk and mule deer winter range.

Sun River WMA

In October 2016, FWP and the Helena-Lewis and Clark National Forest entered into a cooperative agreement to thin and burn 465 acres on the Sun River WMA approximately 12 miles west of Augusta, MT. Thinning and prescribed burning will focus on the removal of Douglas-fir with the objective of promoting native grass and forb production; improving aspen stands; and improving forest health and resilience to insects, disease, and wildfire. USFS personnel from the Rocky Mountain Ranger District, under the authority of the Wyden Amendment, will implement the project between October 2016 and December 2021. The USFS is contributing labor, equipment, and supplies and materials. FWP has committed to pay the USFS using the Forest Management Account and grant funds. FWP has received a grant from the Rocky Mountain Elk Foundation to be used for work completed through February 2018. The treatments are non-commercial and won't result in the sale of forest products. The Sun River WMA is critical elk winter range and up to 95 percent of the Sun River elk herd (as many as 2,700) can be found on the WMA during the middle of winter.

Mount Silcox WMA



Figure 10 - Stand proposed for treatment on the Mount Silcox WMA. Photo Credit: Jason Parke

In December 2016, the Fish and Wildlife Commission endorsed the Mount Silcox WMA Forest Management project which proposes treating approximately 118 acres using timber harvest. The project objectives are to enhance aspen stands, improve understory forage production, and diversify stand structure to promote biodiversity in what are currently dense, single-storied stands. The Mount Silcox WMA is located 1 mile west of Thompson Falls, MT and is critical winter and spring range for elk, deer, and bighorn sheep. The proposed project would result in

the sale of approximately 300 MBF of sawlogs and is expected to generate revenue for the Forest Management Account.

GRANTS

Several projects did not produce merchantable byproducts or the cost of the treatment exceeded the value of the merchantable timber removed. The projects listed below received grant funding to help pay for the cost of the treatment.

Table 5 - Grant Funding Received for Forestry Projects, 2015-2016

PROPERTY	GRANTOR	AMOUNT	PROJECT
Lone Pine State Park	USFS - Western Bark Beetle Prevention, Suppression, & Restoration (PSR). Sub-grant from Montana DNRC.	\$21,071	Masticate Douglas-fir trees to improve forest vigor and resilience to bark beetles.
Milltown State Park	USFS - Western Bark Beetle PSR. Sub-grant from Montana DNRC.	\$15,800	Hand-thinning Douglas-fir and ponderosa pine, slash piling, and burning to improve vigor and reduce bark beetle risk.
Mt. Haggin/Fleecer WMA	Rocky Mountain Elk Foundation	\$8,000	Conifer removal to promote aspen, bitterbrush, sagebrush, and grasslands for big game winter range enhancement.
	Mule Deer Foundation	\$9,000	
West Kootenai WMA	USFS - Western Forestry Leadership Coalition. Sub-grant from Montana DNRC.	\$41,000	Thinning for hazardous fuels reduction, to promote mature forest development, and to reduce the risk of insect and disease outbreaks.
Threemile WMA	USFS - Western Bark Beetle PSR. Sub-grant from Montana DNRC.	\$27,000	Conifer removal to promote aspen and grasslands for big game winter range enhancement. Thinning young conifer stands to reduce mountain pine beetle risk.
Sun River WMA	Rocky Mountain Elk Foundation	\$6,245	Conifer removal and prescribed burning to promote grassland forage production on elk winter range.
Blackfoot-Clearwater WMA (See note below)	US Forest Service, Western Forestry Leadership Coalition	\$62,000*	Conifer removal to promote rough fescue grassland forage production on elk winter range.
	Rocky Mountain Elk Foundation	\$29,758*	
	Rocky Mountain Elk Foundation	\$17,239*	Conifer removal and prescribed burning in aspen stands. Understory thinning and prescribed burning to restore historic stand structure.
TOTAL AWARDED 2015-2016		\$121,116	

*Note: projects with asterisk have been applied for but not awarded as of December 2016. These are not included in the summed total.

Future Projects

The following table shows project areas that have been identified by FWP as priority areas for forestry treatments. Additional priority areas may be identified through the statewide forest management planning process. State Parks and Fishing Access Site projects are anticipated during this time period but project areas have not yet been identified. The acreage and volume listed are estimates and subject to change depending on issues identified during project development and input received from public participation.

Table 5 - WMA Forestry Project List, 2017-2022

Project Area	Region	Est. Acres	Est. Sawlog Volume (MBF)	Species	Implementation Date	Description
Mount Silcox WMA	1	118	300	80% DF, 20% PP	2017 - 2019	Elk and bighorn sheep winter and spring range
Ray Kuhns WMA	1	30	100	90% WL, 10% DF	2017 - 2019	Whitetail deer winter range enhancement
Mt. Haggin WMA	3	150-250	0	DF	2017 - 2019	Elk winter range enhancement (non-commercial)
Blackfoot-Clearwater WMA	2	900	1,200	90% PP, 10% DF	2017 - 2021	Elk winter range enhancement
Threemile WMA	2	750	1,400	90% PP, 10% DF	2018 - 2020	Elk and mule deer winter range, bark beetle and stand replacement fire risk
Nevada Lake WMA	2	400	1,200	70% DF, 15% PP, 15% LP	2018 - 2021	Elk and mule deer winter range enhancement
Bull River WMA	1	450	200	LP, PP, DF	2018 - 2022	Promote mixed conifer, multi-story forest structure development (mostly non-commercial)
Calf Creek WMA	2	300	450	90% PP, 10% DF	2019 - 2021	Elk winter range enhancement
Garrity Mountain WMA	2	200	800	90% LP, 10% DF	2019 - 2022	Elk, mule deer, bighorn sheep winter/spring range
Mt. Haggin WMA	3	~500	1,000 – 2,000	DF, LP	2019 - 2022	Elk and mule deer summer range, aspen, bark beetle and fire risk mitigation

Project Area	Region	Est. Acres	Est. Sawlog Volume (MBF)	Species	Implementation Date	Description
Marshall WMA	2	~500	1,000 – 1,500	LP,WL,DF	2020 - 2022	Wildland-urban interface fuels reduction, lynx habitat, elk summer and fall range
Threemile WMA	2	750	1,400	90% PP, 10% DF	2020 - 2022	Elk and mule deer winter range, bark beetle and stand replacement fire risk
Blackfoot-Clearwater WMA	2	~500	1,000 – 1,500	90% PP, 10% DF	2020 - 2022	Elk winter range enhancement

The next table (Table 6) shows project areas and approximate acres that may be proposed for commercial forest treatments. Additional non-commercial treatments are expected. This plan was developed based on the 2013 Sustained Yield Calculation and doesn't include acquisitions of forest land that have occurred since that time. The acreage of State Park and Fishing Access Site forestry projects were estimated based on the ratio of the acreage of those property types compared to those of the Wildlife Management Areas.

Table 6 – Long Range Planning of FWP Commercial Forest Treatments

Project Area	Region	6-15 Years (acres)	16 -30 Years (acres)	> 30 Years (acres)	Management Objectives/Regime
Ray Kuhns WMA	1	15	70	70	Mature forest cover for whitetail deer winter range. Uneven-aged; single-tree and group select with periodic salvage and sanitation
West Kootenai WMA	1	230	230	230	Mature forest cover for whitetail deer winter range. Uneven-aged; variable density thinning
Woods Ranch WMA	1	115	115	100	Elk and deer winter range. Uneven-aged; single-tree selection, promote multi-story development
Mount Silcox WMA	1	-	120	120	Elk and bighorn sheep winter/spring range. Uneven-aged; thin from below and group selection
Bull River WMA	1	-	70	70	Whitetail deer/multiple wildlife objectives. Uneven-aged; thin from below to maintain mature forest cover
North Swan Valley WMA	1	800	-	-	Whitetail deer/multiple wildlife objectives. Uneven-aged; promote mixed conifer, multi-storied stand structure

Project Area	Region	6-15 Years (acres)	16 -30 Years (acres)	> 30 Years (acres)	Management Objectives/Regime
Blackfoot- Clearwater WMA	2	380	1,800	1,800	Elk and mule deer winter range. Uneven-aged; conifer expansion, thin from below, group selection
Calf Creek WMA	2	130	130	130	Elk winter range. Uneven-aged; conifer expansion and group selection
Threemile WMA	2	600	500	1,000	Elk winter range. Uneven-aged, single tree and group selection
Nevada Lake WMA	2	-	100	100	Elk winter range. Uneven-aged management; conifer expansion and thin from below
Garrity Mountain WMA	2	200	200	-	Elk, mule deer, and bighorn sheep winter/spring range. Even and uneven-aged; lodgepole salvage, aspen enhancement, conifer expansion
Fish Creek WMA	2	-	-	-	Elk and deer winter/summer range with multiple other wildlife objectives. Minimal commercial harvest expected within 30 years
Spotted Dog WMA	2	-	-	-	Elk winter range. Some aspen treatments may occur in the next 15 to 30 years
Marshall WMA	2	270	900	270	Lynx habitat and summer/fall elk range. Even-aged and uneven aged; shelterwood and group selection
Mt. Haggin WMA	3	900	630	630	Year-round elk and mule deer habitat. Even and uneven-aged; salvage, commercial thin, group selection, and conifer expansion
Canyon Creek WMA	3	-	-	150	Elk summer range and fall security. Uneven-aged; single tree selection
Haymaker WMA	5	70	-	-	Elk winter range. Uneven-aged; group selection
Fishing Access Sites	All	20	20	20	Safety, aesthetics, insects and disease risk mitigation, hazardous fuels reduction, and riparian habitat enhancement
State Parks	All	300	300	300	Safety, aesthetics, insects and disease risk mitigation, hazardous fuels reduction

PARTNERSHIPS AND COLLABORATION

- DNRC Cooperative Agreements

In calendar year 2015-2016, FWP worked with DNRC on the Threemile and Blackfoot-Clearwater WMA forestry projects. DNRC service foresters assisted with implementation of the Threemile WMA project including treatment unit layout and design, writing silvicultural prescriptions, tree marking, contract administration, and slash disposal. DNRC service foresters also assisted in the design and writing silvicultural prescriptions for the Blackfoot-Clearwater WMA forestry project. FWP compensated DNRC for this work with funding from the Forest Management Account (see Table 4 – Page 6)

- U.S. Forest Service Cooperative Agreements

FWP has also worked with the USFS on the Gallatin and Sun River WMA forestry projects. On the Gallatin WMA, USFS personnel will enhance aspen stands by removing conifers and prescribed burning. On the Sun River WMA, USFS personnel will remove conifers expanding into grasslands and thin and burn to restore historic forest conditions. For both projects, a combination of grant funding and FWP Forest Management Account will be used to compensate the USFS.

FOREST MANAGEMENT PLANS

- Mount Silcox WMA Forest Management Plan

FWP completed the Mount Silcox WMA Forest Management Plan in December 2016. The management plan provides managers with consistent direction for management of forested habitat on the Mount Silcox WMA while meeting the forestry program legislative mandates. The plan identifies current forest conditions, forest management objectives, stand prescriptions that would achieve those objectives, and a potential timeline for implementation.

- Statewide WMA Forest Management Plan

FWP is developing a statewide programmatic forest management plan to define a vision for how forests will be managed and provide a management philosophy and guidelines for FWP's forest land. Work on developing the plan started in the winter of 2015/2016 and a draft plan for internal review is expected in April 2017.

FOREST INVENTORY AND GIS DATABASE

- Forest Inventory Database

Developing and maintaining information about forest attributes is important for planning needs and tracking conditions of forests managed by FWP. It is also necessary for tracking acquisitions, disposals or sale, or other changes in timber harvest availability in order to complete legislatively mandated updates to the sustained yield calculation. FWP received a GIS database containing information about all forested FWP property from the 2013 sustained yield calculation provided by the contractor, Mason, Bruce, & Girard, Inc (MB&G). FWP's forester and Data Services Section have spent significant time and effort revising the GIS database provided by MB&G to maintain and improve the geospatial and forest attribute data.

In an effort to improve the quality of the forest inventory data and develop a process for collecting forest data, FWP contracted with BDL Forestry, LLC to develop a list of inventory data fields, definitions and codes for the data fields, and a system for collecting the data. The contract was paid for using the Forest Management Account and was completed in July 2016. FWP is currently working on revising the forest inventory database based on recommendations provided by BDL Forestry, LLC.

- Mt. Haggin WMA Road and Feature Inventory

FWP maintains a GIS database for infrastructure (such as roads, culverts, bridges, gates, signs, etc.) located on FWP property. Knowledge of road status and conditions is important for determining access which is crucial for forest management planning and determining what areas are accessible for timber harvest. FWP is contracting with Monture Creek Land Management, Inc. to conduct an inventory of roads and several other road-related features on the Mt. Haggin WMA. The Forest Management Account and Habitat Montana account will split the cost of the contract. The road information gathered from this contract will assist FWP in developing a forest management plan for the Mt. Haggin WMA

CONTRACTING AND BUSINESS PROCESSES

FWP has employed a variety of methods for implementing forestry projects. Those methods have included hiring a private forestry consultant (such as Northwest Management, Inc.) to oversee the layout, design, and contract administration of forest management projects as well as working with DNRC and the USFS through interagency cooperative agreements. More recently, with the hiring of a forester, FWP has been able to contract directly with logging companies and administer its own contracts. Using DNRC's timber sale contract as a template, FWP has developed its own timber sale contract and a process for advertising, awarding, and administering the contract. A mix of private

contractors, interagency agreements, and FWP timber sale contracts will continue to be used. This will provide the Department with diverse options to accomplish work under a variety of circumstances while also tapping into different areas of expertise to implement forestry projects.

CONSERVATION EASEMENTS ASSISTANCE

In addition to implementing the legislative requirements of the forestry program, FWP's forester has provided forestry assistance on a variety of FWP forest management issues. By utilizing FWP's forester, the Department was able to efficiently complete this work.

- W.W. White Memorial Fishing Access Site

In March 2016, FWP's forester assisted the Region 2 FAS manager on a site visit to the W.W. White Memorial FAS near Conner, MT. The FAS is leased from a private landowner who was considering selling the property to FWP, most of which is forested. The landowner was considering implementing a timber harvest on the property prior to selling it and requested FWP provide input on the harvest prescriptions. FWP provided a letter with recommendations in April 2016.

- Kokanee Bend South Conservation Easement

In June 2016, FWP's forester assisted Region 1 personnel on a site visit of the Kokanee Bend South Conservation Easement near Columbia Falls, MT. The landowner harvested trees in the riparian management zone which was prohibited in the conservation easement. FWP's forester assisted in developing mitigations the landowner would need to implement to be compliant with the conservation easement.

- Bolin Ranch Conservation Easement

In September 2016, the logger for the Bolin Ranch requested FWP's forester for a site visit to ensure harvest prescriptions were compliant with conservation easement requirements. FWP's forester visited each of the proposed harvest units with the logger and provided a write-up to FWP's Lands Section (responsible for managing FWP's conservation easements) to document that the prescriptions complied with the easement requirements.

- Mannix Ranch Conservation Easement

In November 2016, FWP's Lands Section requested FWP's forester to provide a timber value appraisal of a timber right. FWP's forester, having knowledge of log values and logging and hauling costs, was able to quickly provide the appraisal to the Lands Section.

EXTERNAL COMMUNICATION AND OUTREACH

- Media

FWP remained engaged with the media throughout implementation of the Threemile WMA forestry project. Three articles were published in the Ravalli Republic during implementation of the project. A local resident in the Bitterroot acknowledged the positive results of the project in an opinion article also published in the Ravalli Republic. In July 2016, following the completion of the Threemile project, NBC Montana interviewed FWP's forester and wildlife biologist for the evening news during a tour that was being hosted by FWP with legislators, local government leaders, and other interested parties.

- Educational Outreach

FWP's forestry program offers a unique perspective and educational opportunities on the topic of forest management. The University of Montana, College of Forestry and Conservation requested FWP's forester to lead a field tour of the Threemile project for wildlife biology students enrolled in the silviculture class in the spring of 2016. FWP's forester also provided a guest lecture to the forest planning class at UM in the spring of 2016.

- Meeting Presentations

A number of organizations have an interest in the FWP's forestry program. FWP's forester has been called on to provide updates at meetings of the Montana Wood Products Association, Montana Forest Products Roundtable, and the Montana Association of Counties.